

MAMMOTH CAVE NATIONAL PARK

PUBLIC USE COUNTING AND REPORTING INSTRUCTIONS

Following are detailed instructions for collecting and reporting data to be entered on Form 10-157, Revised, Monthly Public Use Report by Mammoth Cave National Park. These instructions are effective the date of issuance and will continue in effect unless changed by amendment or by memorandum from the Socio-Economic Studies Division to the superintendent approving a requested change.

Each item below describes the procedures to be followed in collecting public use data and summarizing the various elements of those data for entry on the corresponding line on the 10-157, Monthly Public Use Report.

Recreation Visits

1. A Branch of Transportation (BRTR) inductive loop traffic counter (Station 3202, Lane 2) is located on the east entrance road on the westbound lane. The traffic count is multiplied by the persons-per-vehicle (PPV) multiplier of 2.4 (October through June) or 2.6 (July through September).
2. A BRTR inductive loop traffic counter (Station 3202, Lane 3) is located on the south entrance road on the northbound lane. The traffic count is multiplied by the PPV multiplier of 2.4 (October through June) or 2.6 (July through September).
3. A BRTR inductive loop traffic counter (Station 3201, Lane 4) is located on State Highway 70 on the eastbound lane. The traffic count is reduced for the number of non-recreation vehicles 2404 (October through April) or 2061 (May through September). The reduced traffic count is multiplied by the PPV multiplier of 2.4 (October through June) or 2.6 (July through September).
4. A BRTR inductive loop traffic counter (Station 3201, Lane 2) is located on State Highway 70 on the westbound lane. The traffic count is reduced for the number of non-recreation vehicles 2404 (October through April) or 2061 (May through September). The reduced traffic count is multiplied by the PPV multiplier of 2.4 (October through June) or 2.6 (July through September).

If any of the traffic counters are inoperative during the month, use Table 2 to estimate the traffic count for the days the counter was inoperative. Multiply the number of days the counter was out by the estimated daily traffic count and add it to the recorded traffic count. This procedure is automatically done in the computer program issued to the park.

5. The traffic count from the Green River Ferry operator is divided by two to adjust for multiple use by the same vehicles. The adjusted traffic count is multiplied by the PPV multiplier of 3 (October through April) or 3.5 (May through September).
6. The traffic count from the Houchins River Ferry operator is multiplied by the PPV multiplier of 2.4 (October through June) or 2.6 (July through September).
7. The number of tour buses is multiplied by the persons-per-bus multiplier of 40.
8. The number of overnight visitors at Maple Springs Group Campground.

9. The number of backcountry overnight visitors are multiplied by 1.2 to estimated the total number of backcountry visitors.

10. The number of canoe/boat launches and takeouts at Green River Ferry and Houchins Ferry are multiplied by the persons-per-boat multiplier of 2. The number of visitors using canoes and boats are multiplied by 1.3 to estimate the total number of canoe/boat visitors.

11. The number of horseback riders is multiplied by 1.2 to estimate the total number of horseback riders.

12. The number of tent and recreational vehicle (RV's) overnight visitors at Houchins Campground.

13. The number of visitors using the trails at Temple Hill, Good Spring, Jaggers, and Lincoln is multiplied by 1.2 to estimate total number of trail users.

Non-recreation Visits

Non-recreation vehicles are estimated as 4,122 (May through September) and 4,808 October through April). The non-recreation vehicle count is multiplied by the PPV multiplier of 1.7.

Recreation Visitor Hours

Recreation visitor hours are the sum of the subtotals of each of the categories listed in Table 1. Each subtotal is the result of multiplying the number of visitors associated with that category by its length-of-stay multiplier.

Table 1
Average Length-of-Stay Multipliers by Category

| CATEGORY | AVERAGE LENGTH-OF-STAY |
|-----------------------------|------------------------|
| Day Use (September - March) | 1.0 hour per visit |
| Day Use (April - August) | 1.5 hours per visit |
| Overnight Stays | 12 Hours per overnight |

Non-recreation Visitor Hours

Non-recreation visitors hours are estimated as thirty minutes per visit.

Overnight Stays

Concessionary Lodging - Mammoth Cave Hotel

The number of overnight stays at concessionary managed lodge.

NPS Campgrounds - Headquarters and Houchins Ferry

1 The number of tent or RV sites at Headquarters Campground is estimated by multiplying the number of total overnight stays by the tent/RV multiplier in Table 3.

2. Houchins Ferry is the total number of sites occupied and then multiplied by the tent/RV multiplier. The number of tent/RV sites occupied is then multiplied by the persons-per-site multiplier of 4.

This changes are a result of the park going to a reservation system that does not supply them with the specific number of tent versus RV campers.

NPS Backcountry - Miscellaneous Sites

The number of backcountry overnight stays.

NPS Miscellaneous - Maple Springs Group CG

The number of overnight stays at group camping areas.

Special Use Data

- Line a. The number of cave visitors
- Line b. The number of non--cave visitors
- Line c. The number of vehicles using Green River Ferry
- Line d. The number of vehicles using Houchins Ferry
- Line e. The number of trail users
- Line f. The number of canoe and boat users
- Line g. The number of Miss Green passengers
- Line n. The number of tour buses

Table 2

Average Daily Traffic Counts By Month and Traffic Counter

| MONTH | TRAFFIC COUNTER AND LANE NUMBER | | | |
|-----------|---------------------------------|----------|----------|----------|
| | 3202 (2) | 3202 (3) | 3201 (4) | 3201 (2) |
| January | 260 | 265 | 315 | 325 |
| February | 235 | 240 | 350 | 340 |
| March | 375 | 400 | 360 | 360 |
| April | 670 | 640 | 390 | 390 |
| May | 730 | 630 | 400 | 400 |
| June | 900 | 870 | 400 | 400 |
| July | 1300 | 1150 | 500 | 400 |
| August | 1150 | 1025 | 425 | 425 |
| September | 570 | 520 | 400 | 425 |
| October | 535 | 480 | 390 | 405 |
| November | 350 | 320 | 350 | 370 |
| December | 300 | 275 | 350 | 370 |

Table 3
Tent/RV Multipliers at Headquarters and Houchins Ferry

| MONTH | Headquarters | | Houchins Ferry | |
|-----------|--------------|------|----------------|------|
| | Tents | RV's | Tents | RV's |
| January | 0.50 | 0.50 | 0.70 | 0.30 |
| February | 0.50 | 0.50 | 0.85 | 0.15 |
| March | 0.40 | 0.60 | 0.85 | 0.15 |
| April | 0.40 | 0.60 | 0.70 | 0.30 |
| May | 0.50 | 0.50 | 0.60 | 0.40 |
| June | 0.65 | 0.35 | 0.70 | 0.30 |
| July | 0.75 | 0.25 | 0.70 | 0.30 |
| August | 0.75 | 0.25 | 0.75 | 0.25 |
| September | 0.65 | 0.35 | 0.65 | 0.35 |
| October | 0.60 | 0.40 | 0.70 | 0.30 |
| November | 0.40 | 0.60 | 0.50 | 0.50 |
| December | 0.65 | 0.35 | 0.65 | 0.35 |